

Tentative Outline (Preliminary Proposal of Thematic Issue)

Special/Thematic Issue for the journal Current Medical Imaging

Title of the Thematic Issue: Representation Learning and Dynamic Modeling for Facial Expression Analysis Based on Deep Networks

Guest Editor's Name: *Jianfeng Zhao*

• Scope of the Thematic Issue:

Papers addressing the issues of facial feature analysis, facial feature learning, facial expression feature analysis, facial expression feature learning, facial expression analysis, facial expression recognition, micro-expression analysis, micro-expression recognition and other tasks based on deep static and dynamic facial feature learning, and their applications (e.g., automatic facial expression recognition system, automatic micro-expression analysis system) are invited. Both theoretical and practical progress is encouraged. The topics of interest for this Thematic issue include, but are not limited to:

- Facial feature analysis
- Facial feature learning
- Facial feature localization
- Facial expression feature analysis
- Facial expression feature learning
- Facial expression feature localization
- Facial region localization
- Facial landmark detection
- Facial landmark localization
- Facial image classification
- Facial image generation
- Facial image enhancement
- Facial image segmentation
- Feature selection for emotion analysis
- Feature selection for emotion classification
- Emotional representation learning
- Content-based facial image retrieval
- Incorporating prior knowledge for facial image processing
- Incorporating prior knowledge into recognition of facial expression

Keywords: Feature Analysis, Feature Learning, Expression Analysis, Expression recognition, Representation Learning, Dynamic Modeling, Deep Learning

Sub-topics:

The sub-topics to be covered within the issue should be provided:

- Facial expression analysis and recognition
- Micro-expression analysis and recognition
- Deep facial expression feature learning
- Deep emotional representation learning
- Dynamic modeling for facial expression

Schedule:

- ✧ Deadline to submit the finalized proposal of Thematic issue: **3 months after subjected approval of preliminary proposal**

(“Finalized proposal” would be the same as this document, however the “Tentative titles of the articles and list of contributors with their names, designations, addresses and email addresses” should also be included in the finalized proposal.)

- ✧ Thematic issue abstract deadline: March 31, 2022
- ✧ Thematic issue submission deadline: August 31, 2022

Details of Guest Editor:

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